Test	Pertussis PCR	
Testing Lab	Anchorage	
Disease(s)	Whooping cough	
Organism(s)	Bordetella pertussis and Bordetella parapertussis	
Test Method	Polymerase Chain Reaction (PCR)	
Specimen	 PCR: NP swab (COPAN) in sterile dry tube. 	
Collection	Symptom information on Test Request Form is	
	required. (Cough illness? Duration? Antibiotic treatment?)	
Detailed	Click here for Pertussis PCR-Detailed Collection Instructions	
Collection		
Instructions		
Storage/	 Ship specimen immediately at ambient temperature. 	
Transport	 Refrigerate PCR swab, if possible, until shipped. 	
Results	PCR	9
	B. pertussis DNA	Detected/Not Detected
	B. parapertussis DNA	Detected/Not Detected
Interpretation	Bordetella PCR testing results must be correlated with patient	
	history to confirm as a case of pertussis infection. The PCR test	
	detects the presence of a specific DNA sequence present in	
	Bordetella pertussis. This sequence is also present in	
	Bordetella holmesii (IS481), an uncommon respiratory	
	pathogen of humans.	
Turnaround	PCR: 1-4 days (Testing performed on Monday and Thursday)	
Time		

Pertussis PCR: Detailed Collection Instructions

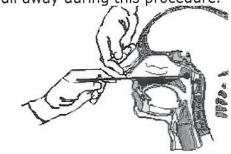
Supplies Needed: Dacron/Polyester Nasopharyngeal Swab

(Fisher # 14-906-23, 22-209-50, 23-600-952, 23-600-955 or VWR # 95041-316) NO cotton or calcium alginate swabs will be accepted.

Anchorage Laboratory Requisition Form

Collection Instructions:

- Assemble all supplies.
- 2. The nasopharyngeal swab used for collecting this sample type has a fine wire shaft.
- 3. One swab is collected for PCR during this procedure as described below.
- 4. Remove any mucus from the patient's nose.
- 5. Estimate the distance to the nasopharynx. Prior to insertion of the swab, measure the distance from the corner of the nose to the front of the ear and insert the shaft ONLY half this length.
- 6. Carefully, open package containing the NP swab and remove swab for sample collection.
- 7. Immobilize the patient's head. Have the patient sit with head against a wall as there is a tendency to pull away during this procedure.



- 8. <u>Gently</u> insert the swab along the medial part of the septum, along the base of the nose, until it reaches the posterior nares. Gentle rotation of the swab may be helpful in accomplishing the insertion. (If resistance is encountered on one side, try the other nostril, as the patient may have a deviated septum).
- 9. Leave swab in place in nasopharynx for 10 seconds, then gently rotate to remove columnar epithelial cells and remove swab.
- 10. Put the NP swab back into tube or paper sleeve.
- 11. Seal paper sleeve with tape to allow external decontamination without compromise of specimen.
- 12. Follow labeling and transport instructions below.

Labeling:

- 1. Clearly label the paper sleeve or tube containing the swab with patient's name and collection date.
- 2. Complete the Anchorage Laboratory Requisition Form, including symptom information.

Transport:

- 1. Place tube or paper sleeve containing swab in the Ziploc portion of a specimen transport bag and seal this portion. Place the completed requisition form in the adjacent pouch.
- 2. Package as a Biological Substance Category B specimen according to all current shipping regulations and transport to the State Public Health Laboratory-Anchorage as soon as possible. Ship at ambient temperature.

NOTE: If possible, hold the swab for PCR at 4°C until transport, ship at ambient temperature.